In the Claims:

Please amend the Claims as follows and without prejudice. This listing of Claims will replace all prior versions, and listings, of claims in the application.

Listing of Claims

1. (CURRENTLY AMENDED) An accelerometer comprising:

a beam diaphragm sensor employing at least [[two]] first and second dielectrically isolated resonant beams, each beam positioned on a common substrate and each beam formed by [[the]] a same fabrication process, each beam having [[a]] an associated diaphragm capable of deflecting when subjected to a force,

a mass coupled to only [[one]] the diaphragm ~~of one~~ associated with said first resonant beam to enable said first beam to alter [[the]] a resonant frequency according to an applied acceleration with said ~~other~~ second resonant beam relatively unaffected by said applied acceleration.

2. (ORIGINAL) The accelerometer according to claim 1 wherein each beam includes a plurality of piezoresistors capable of charging resistance according to an applied force.

3. (CURRENTLY AMENDED) The accelerometer according to claim 1 wherein [[the]] a resonant frequency of said ~~other~~ second beam is subtracted from the altered resonant frequency of said ~~associated~~ first beam to obtain a difference frequency indicative of acceleration.

4. (ORIGINAL) The accelerometer according to claim 1 wherein said mass is fabricated from a high density material.

5. (ORIGINAL) The accelerometer according to claim 4 wherein said high density material is metal.

6. (ORIGINAL) The accelerometer according to claim 5 wherein said metal is tungsten.

7. (ORIGINAL) The accelerometer according to claim 1 wherein said acceleration is applied relatively perpendicular to the diaphragm.

8. (CURRENTLY AMENDED) The accelerometer according to claim 1 wherein said beam ~~pressure~~ diaphragm sensor is fabricated from silicon.

9. (ORIGINAL) The accelerometer according to claim 1 wherein said substrate is p-type silicon.

10. (ORIGINAL) The accelerometer according to claim 1 where said fabrication process includes diffusion-aided fusion bonding.

11. (NEW) An accelerometer comprising: a beam diaphragm sensor having only first and second dielectrically isolated resonant beams each having an associated diaphragm capable of deflecting when subjected to a force; wherein, said diaphragm

associated with said first resonant beam is mass loaded to alter a resonant frequency thereof according to an applied acceleration and a resonant frequency of said second resonant beam is relatively unaffected by said applied acceleration.

In the Drawings:

Please amend the Drawings as follows and without prejudice.

The attached sheet of Drawings includes changes to Figure 1. This sheet, which includes Figures 1 and 2, replaces the original sheet including Figures 1 and 2. In Figure 1, units for the x-axis and y-axis have been inserted.